



Clarus

What It Is

Clarus (Latin for “Clear”) is an Intelligent Transportation Systems (ITS) initiative to improve the quality (e.g. availability, accuracy and timeliness) of road weather information given to road users and operators to improve transportation safety and operations under adverse weather conditions. The core aspect is the design, development and demonstration of a road weather observational database that supports development of such information. The initiative includes:

- Assimilating road weather observations on a national level starting with existing networks, e.g. fixed sensors along roadways installed by State and local DOTs, and incorporating new systems as they emerge (e.g. vehicle-based sensors).
- Developing partnerships across the surface transportation and weather communities, especially strengthening ties among the federal agencies such as the Federal Highway Administration and the National Oceanic and Atmospheric Administration.
- Developing partnerships across the public and private sectors to build upon each sector’s strengths, paving the way for “anytime, anywhere road weather information.”

Current Status

- System design and software development were completed in January 2006, and three State DOTs (Utah, Minnesota and Alaska) participated in a proof-of-concept demonstration, which concluded in December 2006.
- Testing and evaluation of weather-related technologies that could result from the probe data that will be generated by the Vehicle Infrastructure Integration (VII) initiative are also underway.

The Year Ahead

- Conduct the *Clarus* regional demonstrations through:
 - the award of multi-agency cooperative agreements to develop Concepts of Operations for the value-added products that the *Clarus* database management system enables;
 - the expansion of the road weather data feeding into the *Clarus* system through a modest grants process;
 - the award of contracts to the private sector to build the operational concepts captured in the cooperative agreements.
- Further explore the potential to gather road weather observations from vehicles through the VII initiative.
- Conduct the 5th *Clarus* ICC meeting, probably in September 2007.